
THE EUROPEAN STATUS OF THE UK BIODIVERSITY ACTION PLAN MOTHS

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Background

Fifty-three species of moth are treated as priorities for conservation within the UK Biodiversity Action Plan (BAP) (UK Biodiversity Group, 1999a & b). A brief history and an explanation of the rationale behind the UK BAP is given in Parsons, Green & Waring (2000). Butterfly Conservation (BC) is the Lead Partner for 52 of the 53 species, three of these jointly with English Nature (EN), the National Trust and the RSPB. Scottish Natural Heritage is the Lead Partner for the remaining species. In 1999, BC formed the Action for Threatened Moths Project to oversee the implementation of the moth Action Plans.

With so many species and such a wide range of actions stipulated in the Plans, we have tried to select priorities by identifying those species where limited available resources would have maximum impact. This selection took into account the perceived degree of threat, the knowledge of habitat management, the achievability of actions and whether or not there was an existing project, for example as part of ENs Species Recovery Programme. However, no account was taken of the species' distribution or degree of threat within Europe and it was felt that some effort should be made to determine whether any of the UK BAP species should be identified as conservation priorities at an international level.

In a major achievement, Karsholt & Razowski (1996) published a checklist providing species occurrence on a country by country basis throughout Europe. However, it was beyond the remit of that publication to give an indication of status, indeed it is stated in the Introduction that a "national species record may be based on a single specimen". Information on status and trend of individual species over Europe is, where known, at best widely scattered. The current review was therefore started to fill this gap and provide an initial assessment of the European status of the UK BAP moths.

A questionnaire

In 1999, a Red Data Book of European Butterflies was published (Van Swaay & Warren, 1999). This report was based on the distribution and trend data collected for each country through a network of over 50 expert national compilers who each completed a questionnaire. The resulting database allowed an assessment of each species' threat and conservation status. A provisional report was sent to compilers and other experts for checking and revision.

It is probably reasonable to state that the knowledge of the status and distribution of moths in individual countries is less well known than the butterflies in every case. Through the membership list of the *Societas Europaea Lepidopterologica*, personal contacts, recommendations and the advice of Martin Honey (Natural History Museum), over 20 specialists were identified throughout Europe as experts on their countries moth fauna. These specialists covered a wide geographic coverage, although there was a bias towards western Europe and Scandinavia. Using the questionnaire model (after Van Swaay & Warren, 1999), each of the 20 experts were contacted and asked to complete a questionnaire to the best of their ability.

For the purposes of this exercise, the questionnaire considered taxa at the species level only, i.e. the British subspecies were not considered. The questionnaire asked about the following:

- If native; if each of the 53 species was native to their country.
- Abundance; data on abundance was requested. Abundance was regarded as the percentage of grid squares covered reported from 1980 onwards (where this data were available), if the information was not available then best judgement was to be used.
- Trend; trend was described as the change in distribution from 1980 onwards, specifying whether a species was extinct or distributions were decreasing, more or less stable, increasing or were known to fluctuate. Information was requested on the scale of the changes in broad classes.
- Sites; data on the number of sites within each country was sought.
- Information on data quality was requested.
- Habitat type, this based on the CORINE listing which was supplied with the questionnaire.
- Finally, there were questions about available literature relating to distribution maps and Red Data Books or Red Lists and whether or not a European Red Data Book (RDB) for moths should be produced.

Limitations of the data

The task asked of the contributors was substantial. Many of the contributors are already very busy people and, understandably, not all were able to complete the questionnaire as completely as would have been liked. Also data quality and availability varies from country to country and from moth family to family. Consequently, there are problems of interpretation and it proved difficult to compare the results other than at a superficial level. Moreover, returned questionnaires were received from 14 countries (including the UK), which may not represent a sufficient sample from which to draw any firm conclusions. With these limitations in mind the conclusions drawn from this study are considered to be tentative.

Some species are clearly under-recorded or over-looked. For example, the Fiery Clearwing *Pyropteron chrysidiformis* was first reported in the Baden-Württemberg region of Germany in 1971 and is now known from 15 grid squares (A. Steiner pers comm.). Only 12 to 15 examples of the Dingy Mocha *Cyclophora pendularia* have been found in Norway, although it is thought that the species is probably resident and that the precise habitat has not been found (L. Aarvik pers comm.). The degree of under-recording will probably vary across each species' distribution and from species to species.

Preliminary results

Table 1 shows the number of sites reported for each species in the country indicated and Table 2 shows the trend for each species in those countries.

Based on the data, several of the UK BAP species appear to be restricted or confined to a small number of sites in several or many of the countries within their range. Examples of this include the Silky Wave *Idaea dilutaria* which is recorded from a single site in each of Sweden and Belgium, and the Belted Beauty *Lycia zonaria* which is recorded from three sites in Sweden, one or possibly two in Ireland and two in Belgium. Both these species are reported from a number of other countries.

Perhaps more significantly in a European context, two species have been recorded from a very few sites in a very few countries. These are the Marsh Mallow *Hydraecia osseola*, which apart from England has been reported in a few sites from just Spain and Italy, and the Reddish Buff *Acosmetia caliginosa* which was reported from Spain, Italy and the Baden-Württemberg region of Germany. This latter species became extinct in Baden-Württemberg between the 1920s and 1950s due to habitat destruction (A. Steiner pers comm.). Of concern also are those species that are now reported to be extinct in other countries within their range, e.g. Essex Emerald *Antonechloris smaragdaria*, Bright Wave *Idaea ochrata* and Chalk Carpet *Scotopteryx bipunctaria* in Belgium and Orange Upperwing *Jodia croceago* in the Netherlands, Belgium and the Baden-Württemberg region of Germany.

There appears to be no clear pattern in the trends reported for many species, although this may be due to a lack of accurate data. Some species are thought to be declining in some countries but remaining stable or increasing in others, e.g. Toadflax Brocade *Calophasia lunula* and Clay Fan-foot *Paracolax tristalis*. There are a number of species where a general decline is reported: Netted Mountain Moth *Macaria carbonaria*; Narrow-bordered Bee Hawk-moth *Hemaris tityus*; White Spot *Hadena albimacula* (the UK being the exception, this being because of targeted survey effort); Marsh Moth *Athetis pallustris*; Brighton Wainscot *Oria musculosa*; Orange Upperwing *J. croceago*; Heart Moth *Dicycla oo*; Scarce Blackneck *Lygephila cracca*; and Four-spotted *Tyta luctuosa*.

For several other species the trend is not so clear but the suggestion is also one of decline: Small Lappet *Phyllodesma ilicifolia*; Essex Emerald *A. smaragdaria*; Belted Beauty *L. zonaria*; Straw Belle, *Aspitates gilvaria*; Speckled Footman *Coscinia cribraria*; and Square-spotted Clay *Xestia rhomboidaria*. Curiously, the dramatic decline of the Bordered Gothic *Heliophobus reticulata* and Pale Shining Brown *Polia bombycina* in this country does not seem to be reflected elsewhere in Europe. The results for the Buttoned Snout *Hypena rostralis* hint at an increase in fortunes in Europe.

Identifying European priorities

Perhaps the highest priority species should be those which occur on few sites over Europe and which are also declining. Based on the data available, such species include: Straw Belle *A. gilvaria*; White Spot *H. albimacula*; Reddish Buff *A. caliginosa*; Marsh Moth *A. pallustris*; White-spotted Pinion *Cosmia diffinis*; Brighton Wainscot *O. musculosa*; Orange Upperwing *J. croceago*; Heart Moth *D. oo*; and possibly also the Silky Wave *I. dilutaria*, Belted Beauty *L. zonaria* and Scarce Blackneck *L. craccae*. Along with the Marsh Mallow *H. osseola*, with its few sites and restricted distribution, it is perhaps these species for which the UK has a significant international responsibility.

The Basil Thyme Case-bearer *Coleophora tricolor* Walsingham was only reported from one other country. However, it is clear that there is taxonomic confusion over the only micro-moth on the UK BAP and that it may be conspecific with *Coleophora ornatipennella* (Hübner) (S. Koster pers comm.), a species not yet reported from the UK but recorded from France and Belgium (Karsholt & Razowski, 1996).

Table 1: Status of the UK BAP moths in Europe – Number of sites reported

Key

- ✓ Present, but number of sites not reported
- * At least some sites vulnerable (excludes inappropriate management). Data not supplied for all countries.
- R Restricted to few sites or area
- ? Status uncertain
- I/A Immigrant or Adventive
- ** Based on an incomplete return

Key to the countries

NR	Norway	IR	Ireland
DK	Denmark	BL	Belgium
SW	Sweden	ES	Spain
SF	Finland	PR	Portugal
EN	Estonia	IT	Italy
DT(B-W)	Germany (Baden-Wurttemberg only)	AU	Austria
NL	The Netherlands	BG	Bulgaria
GB	Great Britain		

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU**	BG
Zygaenidae															
<i>Zygaena loti</i>						20+		<10		10	+		+	20+	20+
<i>Zygaena viciae</i>	R	✓	20+*	✓	✓	20+	1	1		15	7-10		✓	20+	20+*
Sesiidae															
<i>Pyropteron chrysidiformis</i>						>15		3		3	✓	1	✓	✓	20+*
Coleophoridae															
<i>Coleophora tricolor</i>					2			<5							
Lasiocampidae															
<i>Phyllodesma ilicifolia</i>	✓	✓	✓	✓	✓	1 (1979)	?	0		10	✓	4	✓	✓	5*
Geometridae															
<i>Antonechloris smaragdaria</i>	R			✓	✓	20+		0		0	✓		✓	✓	20+
<i>Cyclophora pendularia</i>	?	✓	✓	✓	✓	20+	6	<15*		20	✓	?	✓	✓	6*
<i>Idaea ochrata</i>		✓	1			✓	20	1		0	✓	20+	✓	✓	20+
<i>Idaea dilutaria</i>			1			✓		3		1	✓	0	✓	✓	17*
<i>Scotopteryx bipunctaria</i>						20+	0	20+		0	✓		✓	20+	20+
<i>Eustroma reticulata</i>	✓	✓	✓	✓	✓	✓		<15*		4	?		✓	✓	9*

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU**	BG
<i>Pareulype berberata</i>		1+	2			✓	17	9	0	10	✓		✓	20+	2*
<i>Rheumaptera hastata</i>	✓	✓	✓	✓	✓	✓	6	20+	3	6	?		✓	20+	3*
<i>Hydrelia sylvata</i>	✓	✓	20+	✓	✓	✓	0	20+	?	8	?		✓		
<i>Minoa murinata</i>						✓	4	20+		6	✓	?	✓	20+	20+
<i>Trichopteryx polyommata</i>	✓		20+	✓	✓	✓	?	20+		0	✓		✓	20+	✓*
<i>Macaria carbonaria</i>	✓	✓	✓	✓	✓			<15					✓	✓	
<i>Epione vespertaria</i>	✓	✓	✓	✓	✓	?	0	4		0	?	?	✓	20+	5*
<i>Lycia zonaria</i>		✓	3*			20+	0	20+*	3	2	?			✓	
<i>Siona lineata</i>	✓	✓	✓	✓	✓	20+	11	4		20+	✓		✓	20+	20+
<i>Aspitates gilvaria</i>				✓	7	20+	0	<10	>1	4	✓	0	✓	✓	8*
Sphingidae															
<i>Hemaris tityus</i>	✓	✓	✓	✓	✓	✓	0	20+*	1	2	✓	0	✓	20+	20+
Arctiidae															
<i>Coscinia cribraria</i>	✓	✓	✓	✓	✓		20+	<5*		8	✓	20+	✓	20+	13*
Noctuidae															
<i>Noctua orbona</i>	✓	✓	✓	✓	✓	ca. 20	20+	20+	?	15	✓	20+	✓	✓	20+

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU**	BG
<i>Protolampra sobrina</i>	✓	✓	✓	✓	✓	10 (post 1970)	?	<20		1	3-4		✓	✓	
<i>Xestia alpicola</i>	✓	I/A	✓	✓	✓			<15	2				✓	✓	
<i>Xestia ashworthii</i>	R	I/A	20+	✓	✓	20+		20+			✓		✓	20+	18*
<i>Xestia rhomboidea</i>	R	✓	✓		2 (I/A?)	20+		20+		4	5-10		✓	20+	20+
<i>Polia bombycina</i>	✓	✓	✓	✓	✓	20+	20+	<20	?	10	5-10		✓	20+	20+
<i>Heliophobus reticulata</i>	✓	✓	✓	✓	✓	20+	20+	<20	1	15	7-10	?	✓	20+	20+
<i>Hadena albimacula</i>	R	✓	✓	✓	✓	10 (post 1970), 9 (post 1980), 2 (1990- 1997)	2	<10		5	✓	6*	✓		20+
<i>Acosmetia caliginosa</i>						0		1			4-5		✓		
<i>Athetis pallustris</i>	R	✓	✓	✓	✓	3	?	<5		0	3-4	?	✓	✓	12*
<i>Calophasia lunula</i>	✓	2-3	✓	✓	✓	20+	20+	<20		12	?		✓	20+	20+
<i>Hydraecia osseola</i>								3-4			7-8		4		
<i>Cosmia diffinis</i>		I/A	1			10 (post 1970)	?	<15		0	✓	1	✓		20+

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU**	BG
<i>Mythimna turca</i>		✓	5	✓	✓	20+	9	20+*		5	4-5		✓	✓	20+
<i>Oria musculosa</i>						ca. 10		1?		1	✓	3*	✓		12*
<i>Jodia croceago</i>						0	0	?		0	✓	3	✓		20+
<i>Dicycla oo</i>		0	20+	I/A		3	?	<5		4	✓	4	✓		20+
<i>Moma alpium</i>		✓	✓	✓	✓	20+	20+	20+*		12	15-20	16*	✓	✓	20*
<i>Shargacucullia lychnitis</i>		✓	10	I/A	2	>20		20+*		6	10-15		✓	20+	6*
<i>Xylena exsoleta</i>	I/A?	✓	✓	✓	4 (I/A?)	ca. 20	?	20+		0	✓	3*	✓	✓	20+
<i>Polymixis xanthomista</i>						20+		20+	?		✓	9*	✓	20+	2*
<i>Lygephila cracca</i>	✓	4-5	✓	✓	5	20+		<10	?	1	✓	6*	✓	20+	20+
<i>Tyta luctuosa</i>		✓	R	I/A	5	20+	I/A	<15		2	✓	20+	✓		20+
<i>Catocala spona</i>	I/A	✓	20+	<10	✓	20+	6	<10		8	✓	0	✓	✓	20+
<i>Catocala promissa</i>		✓	✓	<10	✓	20+	I/A	<20		4	✓	6*	✓	✓	20+
<i>Schrankia taenialis</i>		1	R			3	?	20+	1?	4			✓	✓	20*
<i>Hypena rostralis</i>	R	✓	✓	✓	✓	20+	20+	20+*		20+	✓	9*	✓	20+	20+
<i>Pechipogo strigilata</i>	✓	✓	✓	✓	✓	20+	3	<15	?	6	2	1	✓		20+
<i>Trisateles emortualis</i>	R	✓	✓	✓	✓	20+	16	2?		20+	5-10		✓	✓	20+
<i>Paracolax tristalis</i>	✓	0?	✓	✓	✓	20+	11	<15		1	5-10	1	✓		20+

Literature available

From the completed questionnaires it is clear that many countries have distribution maps available for at least some species or families of moth, although some of these may be rather out of date. These include Belgium (some families); Denmark (some families); Estonia (some); Finland; Germany, Baden-Württemberg (some families); Ireland (some families only); The Netherlands (some families); Portugal (available, but uncertain whether or not published); and Spain (generally outdated and not accurate). This is almost certainly an incomplete list. Similarly, many countries have produced a Red Data Book or Red List, including Denmark; Estonia; Finland; Germany, Baden-Württemberg; Italy; and Spain (although now considered rather outdated).

Table 2: Status of the UK BAP moths in Europe - Trend

Key

- † Extinct
- ↔ More or less stable
- ↑ Possibly increasing
- ↓ Possibly decreasing
- ↑ Increasing
- ↑ Increase (200%)
- ↓ Decreasing
- ↓ Decrease (50-100%)
- ↑↓ Populations fluctuate
- ↑↓ Populations fluctuate, possibly decreasing
- ↑↑ Populations fluctuate, possibly increasing
- ? Trend not known
- ?? Status not known
- I/A Immigrant or Adventive
- * Based on an incomplete return

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GB	Great Britain		

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU*	BG
Zygaenidae															
<i>Zygaena loti</i>						↔		↓		↔	?		↔	↔	?
<i>Zygaena viciae</i>	↓		↓	↓	↔	↔	↖	↔		↔	?		↔	↓	?
Sesiidae															
<i>Pyropteron chrysidiformis</i>						↔		↖		↔	?	↔		?	?
Coleophoridae															
<i>Coleophora tricolor</i>					?		↔	↔							
Lasiocampidae															
<i>Phylloidesma ilicifolia</i>	↔	↓	↔	↔	↔	↓	↔	†		↔	↔	↔	↓	?	?
Geometridae															
<i>Antonechloris smaragdaria</i>	↔			↔	↔	↔		†		†	?		↔	?	↔
<i>Cyclophora pendularia</i>	?	↑	↔	↑	↔	↓	↔	↓		↔	?	?	?	?	?
<i>Idaea ochrata</i>		↑	↑			?	↖	↖		†	?	↔	↔	?	↔
<i>Idaea dilutaria</i>			↔			?		↔		↖	?	†	↔	?	↔
<i>Scotopteryx bipunctaria</i>			↔		↑	↔	↔	↔		†	?		↔	↔	↔
<i>Eustroma reticulata</i>	↔	↓	↔	↓		?	↔	↑		↑	??		?	?	?
<i>Pareulype berberata</i>		↑	↔	↓	↑	?	↔	↖		↑	?		↔	↔	?
<i>Rheumaptera hastata</i>	↔	↓	↔	↑	↑	?	↑	↓	?	↑	??		↔	↔	?
<i>Hydrelia sylvata</i>	↔	↔	↑	↑	↔	?	↖	↔	?	↔	??		↔	↔	?
<i>Minoa murinata</i>						?	↔	↔		↖	?	?	↔	↔	↔

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU*	BG
<i>Trichopteryx polycommata</i>	↔		↑↑	↔	↔	?	?	↓		†	?		?	↔	?
<i>Macaria carbonaria</i>	↓	↓	↔	↓	↔			↔?		†			?	↔	
<i>Epione vespertaria</i>	↔	↓	↔	↓	↔	??	↓	↔		↔	??	?	?	↔	?
<i>Lycia zonaria</i>		↑↑	↓		?	?	↑	↔	?	↔	??			↓	
<i>Siona lineata</i>	↓	↔	↓	↔	↔	?	†	↑	?	↔	?	??	↔	↓	
<i>Aspitates githvaria</i>				↓	↔	?		↓	?	↔	?		↔	?	
Sphingidae															
<i>Hemaris tityus</i>	↔	↓	↑↓	↓	↔	↓	†	↔	↓	↓	↔	†	↔	↔	↔
Arctiidae															
<i>Coscinia cribraria</i>	↔	↓	↔	↓	↔		↔	↓		↑↑	↔	↔	↔	↔	?
Noctuidae															
<i>Noctua orbona</i>	↔	↔	↑↑	↓	↓	↔	↑	↓	??	↔	?	↔	↔	?	↔
<i>Protolampra sobrina</i>	↔	↑↓	↔	↔	↔	↓	†?	↔		↓	?		↔	?	
<i>Xestia alpicola</i>	↔	I/A	↔	↓	↔			↔	?				?	↔	
<i>Xestia ashworthii</i>	↔	I/A	↔	↓	↔			↔					↔	↔	
<i>Xestia rhomboidea</i>	↔	↔	↓	↓	I/A?			↔	?	↔	?		↔	↔	?
<i>Polia bombycina</i>	↔	↔	↑↑	↔	↔			↔	?	↓	?		↔	↔	?
<i>Heliophobus reticulata</i>	↔	↔	↑↑	↓	↔			↔	↔	↓	?		↔	↔	?
<i>Hadena albimacula</i>	↔	↓	↔	↓	↔	↓	↔	↔	↔	↔	?		↔	↔	?
<i>Acosmetia caliginosa</i>	↔		↔	↓	↔	†	↔	↓		↓	?		↔	↔	?

	NR	DK	SW	SF	EN	DT (B-W)	NL	GB	IR	BL	ES	PR	IT	AU*	BG
<i>Athetis pallustris</i>	?	↓	↔	↓	↔	↓	?	↓		†	?	?	↔	↓	↔
<i>Calophasia lunula</i>	↔	↓	↔	↓	↔	↔	↖	↑		↔	??		↔	↔	↔
<i>Hydraecia osseola</i>		I/A	↔		↔	↓	?	↑		†	?	?	?		↔
<i>Cosmia diffinis</i>		↑↑	↓	↓	↔	↔	↑	↔		↓	?	↓	↔	↓	↔
<i>Mythimna turca</i>		I/A				↓		↓		↓	?	↓	↔		↔
<i>Oria musculosa</i>						↓	†?	↓		↓	?	?	↔		↔
<i>Jodia croceago</i>		†				†	?	↓		↓	?	?	↔		?
<i>Dicycla oo</i>		↑↑	I/A	I/A	↔	↓	↖	↓		↔	?	↓	↔	↓	↔
<i>Moma alpium</i>		↓			↔	↔	↖	↑		↔	?	↓	↔	↓	↔
<i>Shargacucullia lychnitis</i>		↓		I/A	↑	↔	↖	↑		↔	?		↔	↔	?
<i>Xylena exsoleta</i>	I/A?	↔	↑	↓	?	↔	↔	↓	?	†	?		↔	↓	?
<i>Polymixis xanthomista</i>						↔		↔	?		?	↓	↔	↔	?
<i>Lygephila cracca</i>		↓		↓	↔	↓		↔		↓	?	?	↔	↔	?
<i>Tyta luctuosa</i>		↓	↔	I/A	↔	↔	I/A	↓		↓	?	↔	↔	↔	?
<i>Catocala sponsa</i>	I/A	↑↑	↓	↑	↑↑	↓	↑	↔		↔	?	†	↔	↓	?
<i>Catocala promissa</i>		↑↑	↔	↓	↑↑	↓	I/A	↔		↓	?	↔	↔	↓	?
<i>Schrankia taenialis</i>		†	↔	↔		?	?	↔	??	↓			?	↓	?
<i>Hypena rostralis</i>	↔?	†	↔	↔	↔	↔	↑	↔		↖	?	↔	↔	↓	↔
<i>Pechipogo strigilata</i>	↔	↔	↔	↓	↓	↔	↑	↓		↓	?	?	↔	↓	?
<i>Trisateles emortualis</i>	↑	↔	↔	↓	↓	↔	↖	↓		↔	?		↔	↓	?
<i>Paracolax tristalis</i>	↔	†?	↔	↓	↑	?	↑	↓		↓	?	?	↔	↓	?

Conclusions

Although the data collated have a number of shortcomings, several species appear to be confined to just a few sites in each of several countries and for some there is the suggestion of a general decline. Based on the results of this survey it is tentatively suggested that the UK has an international responsibility for the conservation of the following species:

Straw Belle <i>A. gilvaria</i>	White-spotted Pinion <i>C. diffinis</i>
White Spot <i>H. albimacula</i>	Brighton Wainscot <i>O. musculosa</i>
Reddish Buff <i>A. caliginosa</i>	Orange Upperwing <i>J. croceago</i>
Marsh Moth <i>A. pallustris</i>	Heart Moth <i>D. oo</i>
Marsh Mallow <i>H. osseola</i>	

The Silky Wave *I. dilutaria*, Belted Beauty *L. zonaria* and Scarce Blackneck *L. cracca* could possibly also be added to this list.

With respect to the UK BAP, although occurring in a distinct ecological niche in the UK, it is clear that the taxonomic status of *Coleophora tricolor* needs investigating.

All but one of the contributors considered that a European Red Data Book for moths was desirable and the majority felt that it should be selective and not a comprehensive treatment of all species. Various comments were received in relation to the possible benefits, or drawbacks, of a European Red Data Book. These can be summarised as follows:

1. Assist in protecting habitats (several mentions)
2. Provide international perspective (several mentions)
3. Aid in prioritising effort within individual countries
4. Easier to find financial support for study of moths
5. Would be a valuable contribution to conservation
6. Important reference book for officials and scientists
7. Could lead to a ban on collecting listed species

At present there are no plans to undertake a European RDB for moths, but this would clearly be extremely valuable if adequate resources could be found.

Finally, an appeal: I would be pleased to hear from anyone with information on the status of any of the UK BAP species from any other European countries.

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Early appearance of the Spring Usher *Agriopsis leucophaearia* (D. & S.) (Lep.: Geometridae) in north London (Middlesex) in January

During the morning of 25 January 2001, a mild, showery, but sunny day, my wife brought in a moth found fluttering on the wet ground in a neighbour's garden. It was a fine, fresh, male Spring Usher *Agriopsis leucophaearia*, and had obviously only recently emerged. I have not found this species previously in the area and Colin Plant (1993. *Larger moths of the London Area*. LNHS) says of it "... a widespread, but rather local resident, generally not found in the urban area of London and relatively infrequently in the suburbs". Both Plant and Bernard Skinner (1984. *Colour identification guide to moths of the British Isles*. Viking), note that the moth usually emerges from mid-February to mid-March, hence its colloquial name. As a boy, I used to find this species commonly in Clowes Wood, Warwickshire (see Hammond, H. E., 1957. A survey of the Lepidoptera of a small oak-beech wood on the Midland Keuper Marl with ecological notes on the species. *Proc. Birmingham nat. Hist. phil. Soc.* **18**(6): 147-173), but from my youthful notebooks the earliest male *A. leucophaearia* I ever found was there on 7 February (in 1948).— K. G. V. SMITH, 70 Hollickwood Avenue, London N12 0LT.